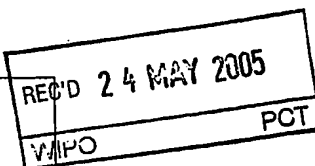


PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY



PCT

To:

see form PCT/ISA/220

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY (PCT Rule 43bis.1)

Date of mailing
(day/month/year) see form PCT/ISA/210 (second sheet)

Applicant's or agent's file reference
see form PCT/ISA/220

FOR FURTHER ACTION
See paragraph 2 below

International application No.
PCT/B2005/050183

International filing date (day/month/year)
17.01.2005

Priority date (day/month/year)
20.01.2004

International Patent Classification (IPC) or both national classification and IPC
G06F17/30

Applicant
KONINKLIJKE PHILIPS ELECTRONICS, N.V.

1. This opinion contains indications relating to the following items:

- ☒ Box No. I Basis of the opinion
- ☒ Box No. II Priority
- ☐ Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- ☐ Box No. IV Lack of unity of invention
- ☒ Box No. V Reasoned statement under Rule 43bis.1 (a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- ☐ Box No. VI Certain documents cited
- ☐ Box No. VII Certain defects in the international application
- ☐ Box No. VIII Certain observations on the international application

2. FURTHER ACTION

If a demand for international preliminary examination is made, this opinion will usually be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA"). However, this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1b/s(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of three months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

3. For further details, see notes to Form PCT/ISA/220.

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**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.
PCT/IB2005/050183

Box No. I Basis of the opinion

1. With regard to the **language**, this opinion has been established on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.
 - ☐ This opinion has been established on the basis of a translation from the original language into the following language , which is the language of a translation furnished for the purposes of international search (under Rules 12.3 and 23.1(b)).
2. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:
 - a. type of material:
 - ☐ a sequence listing
 - ☐ table(s) related to the sequence listing
 - b. format of material:
 - ☐ in written format
 - ☐ in computer readable form
 - c. time of filing/furnishing:
 - ☐ contained in the international application as filed.
 - ☐ filed together with the international application in computer readable form.
 - ☐ furnished subsequently to this Authority for the purposes of search.
3. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.
4. Additional comments:

Box No. II Priority

1. ☒ The validity of the priority claim has not been considered because the International Searching Authority does not have in its possession a copy of the earlier application whose priority has been claimed or, where required, a translation of that earlier application. This opinion has nevertheless been established on the assumption that the relevant date (Rules 43*bis*.1 and 64.1) is the claimed priority date.
2. ☐ This opinion has been established as if no priority had been claimed due to the fact that the priority claim has been found invalid (Rules 43*bis*.1 and 64.1). Thus for the purposes of this opinion, the international filing date indicated above is considered to be the relevant date.
3. Additional observations, if necessary:

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.
PCT/IB2005/050183

Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. Statement

Novelty (N)	Yes: Claims	1-20
	No: Claims	
Inventive step (IS)	Yes: Claims	
	No: Claims	1-20
Industrial applicability (IA)	Yes: Claims	1-20
	No: Claims	

2. Citations and explanations

see separate sheet

Re Item V.

1 Reference is made to the following document:

- D1: US 2003/229537 A1 (DUNNING TED E ET AL) 11 December 2003 (2003-12-11)
D2: HUANG T.: "A Tough Match" PC MAGAZINE - PCMAG.COM, 7 September 2003 (2003-09-07), XP002327130 Retrieved from the Internet:
http://www.pcmag.com/article2/0,1759,1_651363,00.asp [retrieved on 2005-04-29]
D3: US-A-5 616 876 (CLUTS ET AL) 1 April 1997 (1997-04-01)
D4: WO 02/31828 A (KONINKLIJKE PHILIPS ELECTRONICS N.V) 18 April 2002 (2002-04-18)
D5: AUCOUTURIER J-J ET AL: "MUSIC SIMILARITY MEASURES: WHAT'S THE USE?" PROCEEDINGS ANNUAL INTERNATIONAL SYMPOSIUM ON MUSIC INFORMATION RETRIEVAL, October 2000 (2000-10), page COMPLETE, XP008014098
D6: PAUWS S ET AL: "PATS: Realization and User Evaluation of an Automatic Playlist Generator" PROCEEDINGS OF 3RD INTERNATIONAL CONFERENCE ON MUSIC INFORMATION RETRIEVAL (ISMIR 2002), PARIS, FRANCE, 13 October 2002 (2002-10-13), - 17 October 2002 (2002-10-17) pages 1-9, XP002325429 INSTITUT DE RECHERCHE ET COORDINATION ACOUSTIQUE ET MUSIQUE IRCAM CENTRE POMPIDOU, PARIS, FRANCE
D7: WO 01/90926 A (NAPSTER, INC) 29 November 2001 (2001-11-29)

2 INDEPENDENT CLAIM 1

- 2.1 The present application does not meet the criteria of Article 33(1) PCT, because the subject-matter of claim 1 is not inventive in the sense of Article 33(3) PCT.
Document D1, regarded as the closest prior art, discloses (the references in parentheses applying to this document):
A system comprising:
a playlist generator that is configured to create a playlist (see "generation of track lists" in §211 I.1-4), and includes:
a) an artist similarity module that is configured to identify one or more similar artists to an identified artist to create an artist list (see §92, §117 I.9-11, §143 last four

lines, §211, §213 last two lines, §252, §257-§260, fig.11), and

b) an item selector, that is configured to:

- select a selected item associated with the similar artist from a source of items (see §92 I.12-15, §143 last four lines, §213 last two lines), and
- include an identifier of the selected item in the playlist (as required in order to "generate the track lists" according to §211 I.1-4, as immediately and unambiguously derived by the skilled person).

2.2 The only difference between the disclosure of D1 and the subject-matter of claim 1 is that D1 does not explicitly teach "an artist selector (...) configured to select a selected artist from the artist list", and in consequence that tracks of the "selected artist" are selected in step b).

2.3 The problem to be solved by the present invention may therefore be regarded as how to constrain the set of results (recommended similar artists) searched and presented by the system of D1 (cf. §252, fig.11) to a reasonably small subset of artists being of real interest to the user.

2.4 The feature of providing a selector in the user interface to enable choosing from the list displayed (cf. fig. 11) in order to solve the said problem is a common general knowledge in the art. The skilled person would therefore regard it as a normal design option to include this feature in the system described in document D1 in order to solve the problem posed.

The subject-matter of claim 1 does therefore not meet the requirements of Article 33 (1) (3) PCT in respect of inventive step.

2.5 For the sake of completeness, it is pointed out that documents D2 and D3 disclose similar features and lack of inventive step of claim 1 could be also demonstrated using any one of said documents as the closest prior art.

3 INDEPENDENT CLAIM 13

Independent claim 13 contains only corresponding features to claim 1 and therefore it does not meet the requirements of Article 33 (1) (3) PCT in respect of inventive step for the same reasons as stated above.

4 INDEPENDENT CLAIMS 1, 13 AS IMPLEMENTATION OF HUMAN BEHAVIOUR

For the sake of completeness, it is pointed out that the method of claim 13 is anticipated by the known human practice of building a playlist (e.g. of MP3 tracks) manually, with usage of the memory (knowledge) of similar artists of the human being "executing" said method/practice and perhaps well known tools to search songs by author/title and add them to a playlist.

The current wording of claim 13 does not comprise any limitation as to automatic implementation of said method (e.g. in a computer). Consequently, its entirely manual execution falls in scope of said wording, thus anticipating it and even raising doubts as to the novelty of claimed subject matter (Article 33 (1)-(2) PCT).

However, even if said wording is interpreted as a computer-implemented method, a mere idea of automating human behaviour does not involve inventive step (Article 33 (1) (3) PCT). The same reasoning could be applied, mutatis mutandis, to the independent claim 1.

5 DEPENDENT CLAIMS 2-12, 14-20

- 5.1 The dependent claims 2-12, 14-20 do not appear to contain any additional features which, in combination with the features of any claim to which they refer, meet the requirements of Article 33(3) PCT in respect of inventive step, since these features are either known from or suggested by the prior art (cf. D1, D3, D4, D5) and/or specify merely common knowledge in the technical field.
- 5.2 For example, for claims 8, 9, 16, 17, consider the "matching closeness indicator" implemented as a slider in D3 col.16 l.5-15 and col.17 l.50 - col.18 l.43.
- 5.3 For example, for claims 10 and 18 consider the "flexibility knob/slider" of D4 (see p.1

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING
AUTHORITY (SEPARATE SHEET)**

International application No.

PCT/IB2005/050183

l.17- p.2 l.4) or the "AHA slider" of D5 (see §3.4.2 on p.4-5 and §4 on p.5-6).

- 5.4 For example, for claims 11 and 19 note that clustering in order to identify similar data items (e.g. songs) is a common general knowledge in data mining and retrieval, known to be used for playlist generation (cf. e.g. D6 abstract, §2.4 on p.3-4 or D7 p.11 l.20 - p.12 l.5 ff.).

PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY

To:

see form PCT/ISA/220

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WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY (PCT Rule 43bis.1)

Date of mailing
(day/month/year) see form PCT/ISA/210 (second sheet)

Applicant's or agent's file reference
see form PCT/ISA/220

FOR FURTHER ACTION
See paragraph 2 below

International application No.
PCT/IB2005/050183

International filing date (day/month/year)
17.01.2005

Priority date (day/month/year)
20.01.2004

International Patent Classification (IPC) or both national classification and IPC
G06F17/30

Applicant
KONINKLIJKE PHILIPS ELECTRONICS, N.V.

1. This opinion contains indications relating to the following items:

- ☒ Box No. I Basis of the opinion
- ☒ Box No. II Priority
- ☐ Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- ☐ Box No. IV Lack of unity of invention
- ☒ Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- ☐ Box No. VI Certain documents cited
- ☐ Box No. VII Certain defects in the international application
- ☐ Box No. VIII Certain observations on the international application

2. FURTHER ACTION

If a demand for international preliminary examination is made, this opinion will usually be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA"). However, this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1bis(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of three months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

3. For further details, see notes to Form PCT/ISA/220.

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Authorized Officer

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**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.
PCT/IB2005/050183

Box No. I Basis of the opinion

1. With regard to the **language**, this opinion has been established on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.
 - ☐ This opinion has been established on the basis of a translation from the original language into the following language , which is the language of a translation furnished for the purposes of international search (under Rules 12.3 and 23.1(b)).
2. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:
 - a. type of material:
 - ☐ a sequence listing
 - ☐ table(s) related to the sequence listing
 - b. format of material:
 - ☐ in written format
 - ☐ in computer readable form
 - c. time of filing/furnishing:
 - ☐ contained in the international application as filed.
 - ☐ filed together with the international application in computer readable form.
 - ☐ furnished subsequently to this Authority for the purposes of search.
3. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.
4. Additional comments:

Box No. II Priority

1. ☒ The validity of the priority claim has not been considered because the International Searching Authority does not have in its possession a copy of the earlier application whose priority has been claimed or, where required, a translation of that earlier application. This opinion has nevertheless been established on the assumption that the relevant date (Rules 43bis.1 and 64.1) is the claimed priority date.
2. ☐ This opinion has been established as if no priority had been claimed due to the fact that the priority claim has been found invalid (Rules 43bis.1 and 64.1). Thus for the purposes of this opinion, the international filing date indicated above is considered to be the relevant date.
3. Additional observations, if necessary:

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.:
PCT/IB2005/050183

**Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or
Industrial applicability; citations and explanations supporting such statement**

1. Statement

Novelty (N)	Yes: Claims	1-20
	No: Claims	
Inventive step (IS)	Yes: Claims	
	No: Claims	1-20
Industrial applicability (IA)	Yes: Claims	1-20
	No: Claims	

2. Citations and explanations

see separate sheet

Re Item V.

1 Reference is made to the following document:

- D1: US 2003/229537 A1 (DUNNING TED E ET AL) 11 December 2003 (2003-12-11)
- D2: HUANG T.: "A Tough Match" PC MAGAZINE - PCMAG.COM, 7 September 2003 (2003-09-07), XP002327130 Retrieved from the Internet:
http://www.pcmag.com/article2/0,1759,1_651363,00.asp [retrieved on 2005-04-29]
- D3: US-A-5 616 876 (CLUTS ET AL) 1 April 1997 (1997-04-01)
- D4: WO 02/31828 A (KONINKLIJKE PHILIPS ELECTRONICS N.V) 18 April 2002 (2002-04-18)
- D5: AUCOUTURIER J-J ET AL: "MUSIC SIMILARITY MEASURES: WHAT'S THE USE?" PROCEEDINGS ANNUAL INTERNATIONAL SYMPOSIUM ON MUSIC INFORMATION RETRIEVAL, October 2000 (2000-10), page COMPLETE, XP008014098
- D6: PAUWS S ET AL: "PATS: Realization and User Evaluation of an Automatic Playlist Generator" PROCEEDINGS OF 3RD INTERNATIONAL CONFERENCE ON MUSIC INFORMATION RETRIEVAL (ISMIR 2002), PARIS, FRANCE, 13 October 2002 (2002-10-13), - 17 October 2002 (2002-10-17) pages 1-9, XP002325429 INSTITUT DE RECHERCHE ET COORDINATION ACOUSTIQUE ET MUSIQUE IRCAM CENTRE POMPIDOU, PARIS, FRANCE
- D7: WO 01/90926 A (NAPSTER, INC) 29 November 2001 (2001-11-29)

2 INDEPENDENT CLAIM 1

2.1 The present application does not meet the criteria of Article 33(1) PCT, because the subject-matter of claim 1 is not inventive in the sense of Article 33(3) PCT. Document D1, regarded as the closest prior art, discloses (the references in parentheses applying to this document):

A system comprising:

a playlist generator that is configured to create a playlist (see "generation of track lists" in §211 I.1-4), and includes:

- a) an artist similarity module that is configured to identify one or more similar artists to an identified artist to create an artist list (see §92, §117 I.9-11, §143 last four

lines, §211, §213 last two lines, §252, §257-§260, fig.11), and

- b) an item selector, that is configured to:
- select a selected item associated with the similar artist from a source of items (see §92 I.12-15, §143 last four lines, §213 last two lines), and
 - include an identifier of the selected item in the playlist (as required in order to "generate the track lists" according to §211 I.1-4, as immediately and unambiguously derived by the skilled person).
- 2.2 The only difference between the disclosure of D1 and the subject-matter of claim 1 is that D1 does not explicitly teach "an artist selector (...) configured to select a selected artist from the artist list", and in consequence that tracks of the "selected artist" are selected in step b).
- 2.3 The problem to be solved by the present invention may therefore be regarded as how to constrain the set of results (recommended similar artists) searched and presented by the system of D1 (cf. §252, fig.11) to a reasonably small subset of artists being of real interest to the user.
- 2.4 The feature of providing a selector in the user interface to enable choosing from the list displayed (cf. fig. 11) in order to solve the said problem is a common general knowledge in the art. The skilled person would therefore regard it as a normal design option to include this feature in the system described in document D1 in order to solve the problem posed.
The subject-matter of claim 1 does therefore not meet the requirements of Article 33 (1) (3) PCT in respect of inventive step.
- 2.5 For the sake of completeness, it is pointed out that documents D2 and D3 disclose similar features and lack of inventive step of claim 1 could be also demonstrated using any one of said documents as the closest prior art.

3 INDEPENDENT CLAIM 13

Independent claim 13 contains only corresponding features to claim 1 and therefore it does not meet the requirements of Article 33 (1) (3) PCT in respect of inventive step for the same reasons as stated above.

4 INDEPENDENT CLAIMS 1, 13 AS IMPLEMENTATION OF HUMAN BEHAVIOUR

For the sake of completeness, it is pointed out that the method of claim 13 is anticipated by the known human practice of building a playlist (e.g. of MP3 tracks) manually, with usage of the memory (knowledge) of similar artists of the human being "executing" said method/practice and perhaps well known tools to search songs by author/title and add them to a playlist.

The current wording of claim 13 does not comprise any limitation as to automatic implementation of said method (e.g. in a computer). Consequently, its entirely manual execution falls in scope of said wording, thus anticipating it and even raising doubts as to the novelty of claimed subject matter (Article 33 (1)-(2) PCT).

However, even if said wording is interpreted as a computer-implemented method, a mere idea of automating human behaviour does not involve inventive step (Article 33 (1) (3) PCT). The same reasoning could be applied, mutatis mutandis, to the independent claim 1.

5 DEPENDENT CLAIMS 2-12, 14-20

5.1 The dependent claims 2-12, 14-20 do not appear to contain any additional features which, in combination with the features of any claim to which they refer, meet the requirements of Article 33(3) PCT in respect of inventive step, since these features are either known from or suggested by the prior art (cf. D1, D3, D4, D5) and/or specify merely common knowledge in the technical field.

5.2 For example, for claims 8, 9, 16, 17, consider the "matching closeness indicator" implemented as a slider in D3 col.16 l.5-15 and col.17 l.50 - col.18 l.43.

5.3 For example, for claims 10 and 18 consider the "flexibility knob/slider" of D4 (see p.1

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING
AUTHORITY (SEPARATE SHEET)**

International application No.

PCT/IB2005/050183

l.17- p.2 l.4) or the "AHA slider" of D5 (see §3.4.2 on p.4-5 and §4 on p.5-6).

- 5.4 For example, for claims 11 and 19 note that clustering in order to identify similar data items (e.g. songs) is a common general knowledge in data mining and retrieval, known to be used for playlist generation (cf. e.g. D6 abstract, §2.4 on p.3-4 or D7 p.11 l.20 - p.12 l.5 ff.).